

CLAIMS

I claim:

1. A method for preventing, or reducing the likelihood of, renal failure in a living being due to the presence of a contrast media agent in the bloodstream of the being, said 5 method comprising the step of reducing the viscosity of the blood in the kidney.

2. The method of Claim 1 wherein said step of reducing the viscosity of the blood in the kidney comprises applying vibratory energy to the kidney.

3. The method of Claim 2 wherein said vibratory energy comprises ultrasonic energy.

4. The method of Claim 2 wherein said step of applying vibratory energy comprises shaking thromboses formed in the microvessels of the kidney.

5. The method of Claim 2 wherein said step of applying vibratory energy comprises breaking blood clots formed in the microvessels of the kidney.

6. The method of Claim 1 wherein said step of reducing the viscosity of the blood in the kidney comprises applying heat to the kidney.

7. An apparatus for preventing, or reducing the likelihood of, renal failure in a living being due to the presence of a contrast media agent in the bloodstream of the being, said apparatus comprising a vibrator for producing vibratory energy when energized, said apparatus being locatable with respect to the body of the being to provide the vibratory 20 energy to the being to reduce the viscosity of the blood in the being's kidney.

8. The apparatus of Claim 7 wherein said vibrator is a mechanical vibrator that is disposed on the back of the being in the vicinity of the kidney to reduce the viscosity of the blood in the kidney.

9. The apparatus of Claim 8 further comprising a function generator coupled to said mechanical vibrator for generating the frequency of the vibratory energy.

10. The apparatus of Claim 9 further comprising a power source coupled to said function generator for energizing the function generator.

5        11. The apparatus of Claim 10 further comprising an amplifier coupled between said function generator and said mechanical vibrator for amplifying the frequency of the vibratory energy that is supplied to said mechanical vibrator.

12. The apparatus of Claim 7 wherein said vibrator is an ultrasonic device.

10        13. The apparatus of Claim 11 wherein said mechanical vibrator is an ultrasonic device.

15        14. An apparatus for preventing, or reducing the likelihood of, renal failure in a living being due to the presence of a contrast media agent in the bloodstream of the being, said apparatus comprising a heater for producing heat energy when energized, said apparatus being locatable with respect to the body of the being to provide the heat energy to the being to reduce the viscosity of the blood in the being's kidney.

15. The apparatus of Claim 14 wherein said heater is disposed on the back of the being in the vicinity of the kidney to reduce the viscosity of the blood in the kidney.

16. The apparatus of Claim 15 further comprising a power supply coupled to said heater for energizing said heater.